

Title (en)

SET OF INK AND CLEANING LIQUID, INKJET PRINTING METHOD, AND INKJET PRINTING DEVICE

Title (de)

SATZ AUS TINTE UND REINIGUNGSFLÜSSIGKEIT, TINTENSTRAHldruckverfahren und Tintenstrahldruckvorrichtung

Title (fr)

ENSEMBLE D'ENCRE ET LIQUIDE DE NETTOYAGE, PROCÉDÉ D'IMPRESSION À JET D'ENCRE ET IMPRIMANTE À JET D'ENCRE

Publication

**EP 3336151 A1 20180620 (EN)**

Application

**EP 17207473 A 20171214**

Priority

- JP 2016243425 A 20161215
- JP 2017210601 A 20171031

Abstract (en)

A set includes an ink and a cleaning liquid, wherein the cleaning liquid includes water and a first organic solvent, wherein a liquid mixture of the water and the first organic solvent has a Hansen solubility parameter including a hydrogen bond term of 10.0 (cal/cm<sup>3</sup>) 1/2 or less, wherein the ink includes water, a second organic solvent, a polyurethane resin particle, and a polysiloxane surfactant having an HLB value of 8 or less, wherein the polyurethane resin particle accounts for 5 percent by mass or more of a total amount of the ink.

IPC 8 full level

**C09D 11/102** (2014.01); **C09D 11/38** (2014.01); **C09D 11/40** (2014.01); **C09D 11/54** (2014.01)

CPC (source: EP US)

**B41J 2/16552** (2013.01 - US); **C09D 11/102** (2013.01 - EP US); **C09D 11/322** (2013.01 - US); **C09D 11/38** (2013.01 - EP US);  
**C09D 11/40** (2013.01 - EP US); **C09D 11/54** (2013.01 - EP US); **C11D 7/5022** (2013.01 - US)

Citation (applicant)

- CHARLES M. HANSEN: "Hansen Solubility Parameters: A Users Hand book", 2007, CRC PRESS
- TAKEO YASUDA: "JOURNAL OF THE JAPAN PLASTICS INDUSTRY FEDERATION, "Plastics", article "Test Method and Evaluation Result of Each Dynamic Property of Plastic Material (22"

Citation (search report)

- [A] EP 2682269 A1 20140108 - KONICA MINOLTA INC [JP]
- [A] US 2013213440 A1 20130822 - OHTA HITOSHI [JP]
- [A] US 2013194345 A1 20130801 - TAMAI TAKASHI [JP], et al

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Designated contracting state (EPC)

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Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

**EP 3336151 A1 20180620; EP 3336151 B1 20190306; EP 3336151 B2 20231108; EP 3336151 B8 20190522; US 10189262 B2 20190129;**  
US 2018170061 A1 20180621

DOCDB simple family (application)

**EP 17207473 A 20171214; US 201715842003 A 20171214**